B. Amendments to the Claims:

This listing of the claims replaces all prior versions of the claims in the application:

Listing of the Claims:

1. (currently amended) A method for transplantation of at least about ~~500,000~~1x10^6 mitogenic growth factor-responsive neural stem cells capable of differentiating into neurons, oligodendrocytes, or astrocytes, the method comprising ~~to a brain of a living host subject, wherein the cells~~

(a) administering said neural stem cells ~~are transplanted~~ to a first ~~locus~~area of the brain of a living host subject, said first area comprising multiple loci for receiving an aliquot of the neural stem cells; and

(b) ~~migrate *in vivo* from the first locus toward a second locus following infusion of~~ infusing a mitogenic growth factor ~~that does not induce differentiation of the neural stem cells~~ at ~~the~~ a second ~~locus~~area of the brain of said host subject~~;~~,

~~(c) are capable of differentiating *in situ* into a cell selected from the group consisting of neurons, oligodendrocytes, and astrocytes following migration to the second locus; and~~

~~(d)~~ wherein the transplanted neural stem cells retain their ~~*in vivo*~~ responsiveness to the mitogenic growth factor *in vivo* and migrate from the first area toward the second area, and wherein the neural stem cells are capable of differentiating into a cell selected from the group consisting of neurons, astrocytes, or oligodendrocytes following migration to the second area.

2. (previously presented) The method of claim 1, wherein said neural stem cells are mammalian embryonic neural stem cells.

3. (currently amended) The method of claim 1, wherein said first ~~locus~~ area is in the striatum of the brain and wherein said second ~~locus~~area is in the lateral ventricle of the brain.

4-5. (canceled)

6. (previously presented) The method of claim 1, wherein said neural stem cells are cultured in media comprising the mitogenic growth factor prior to transplantation.

7-12. (canceled)

13. (previously presented) The method of claim 6, wherein said culture is a suspension culture.

14. (previously presented) The method of claim 6, wherein said culture is an adherent culture.